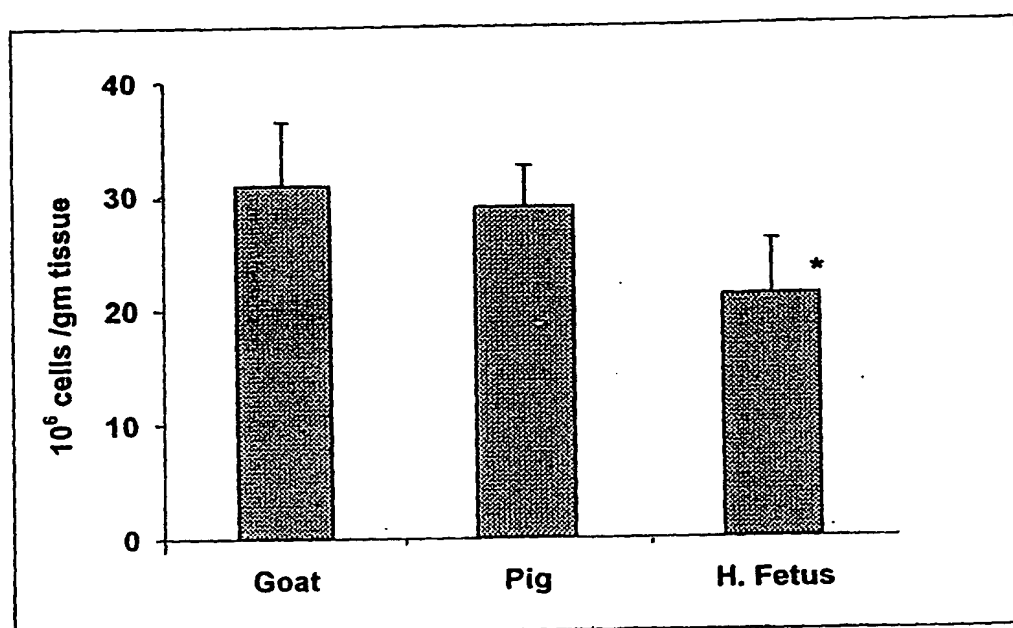
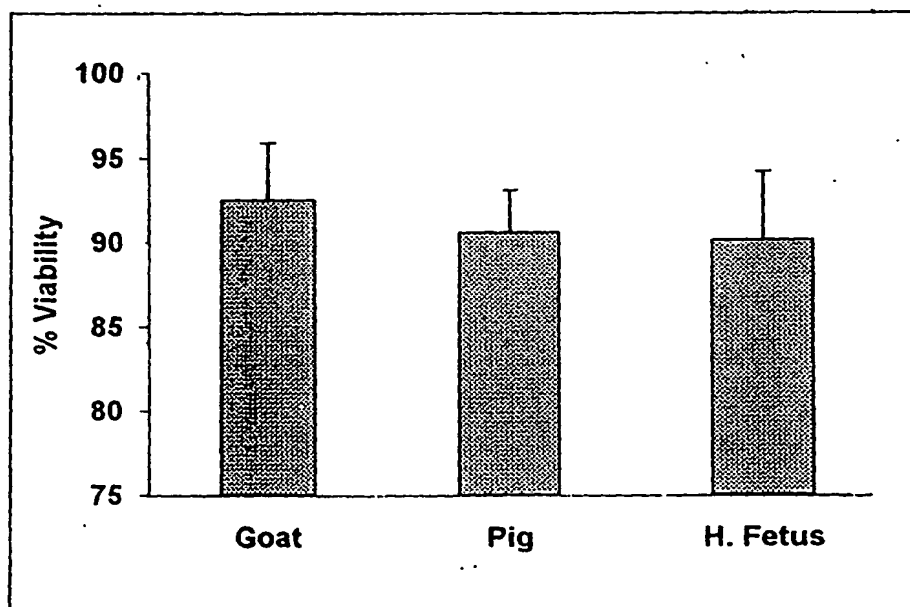


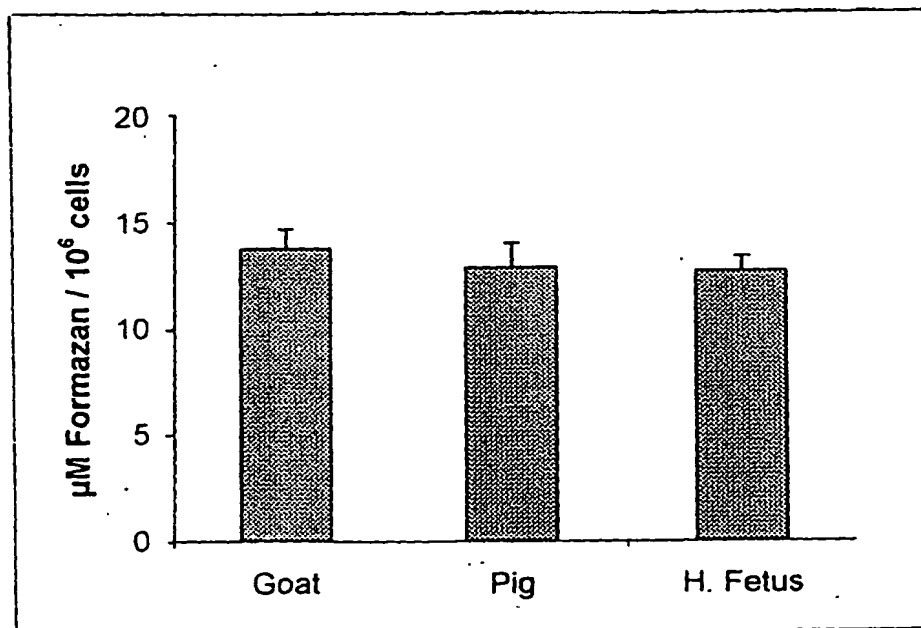
Fig. 1 Cell yield

Each value represents mean \pm S.D of eight independent experiments.

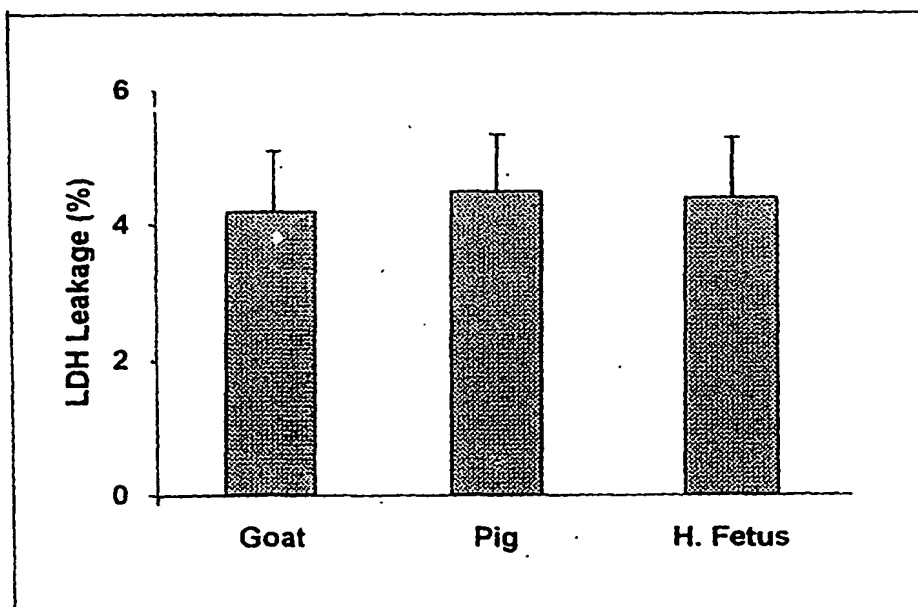
* shows significant difference $p < 0.01$ compared to goat and pig.

Fig. 2 Trypan Blue Dye Exclusion Test

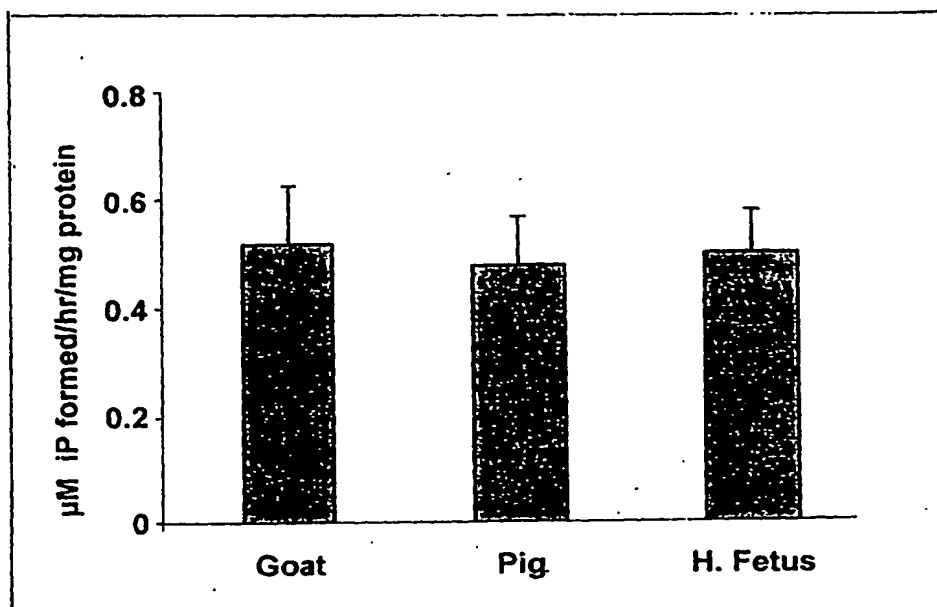
Each value represents mean \pm S.D of eight independent experiments.

Fig. 3 MTT assay

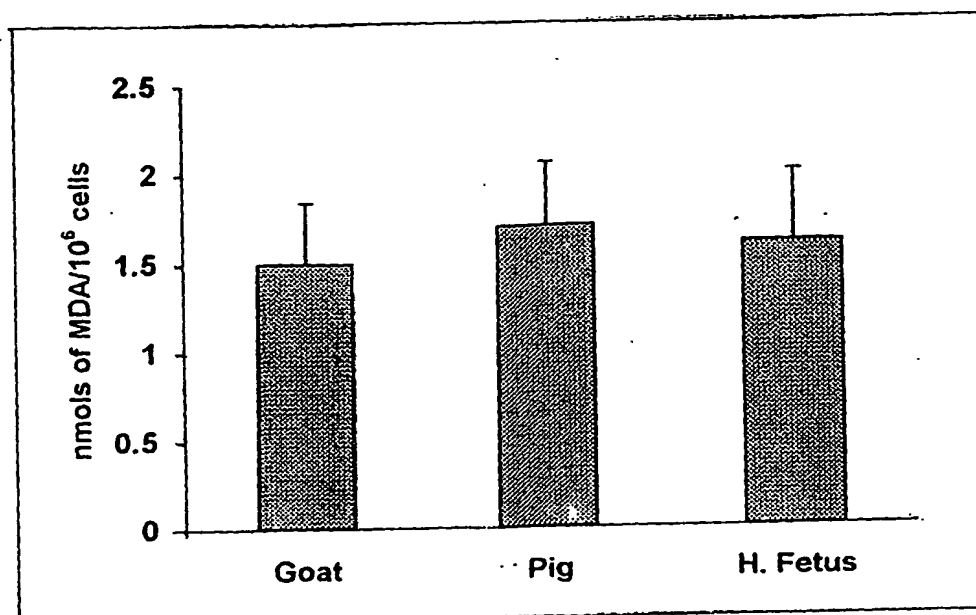
Each value represents mean \pm S.D of eight independent experiments.

Fig. 4 LDH Leakage

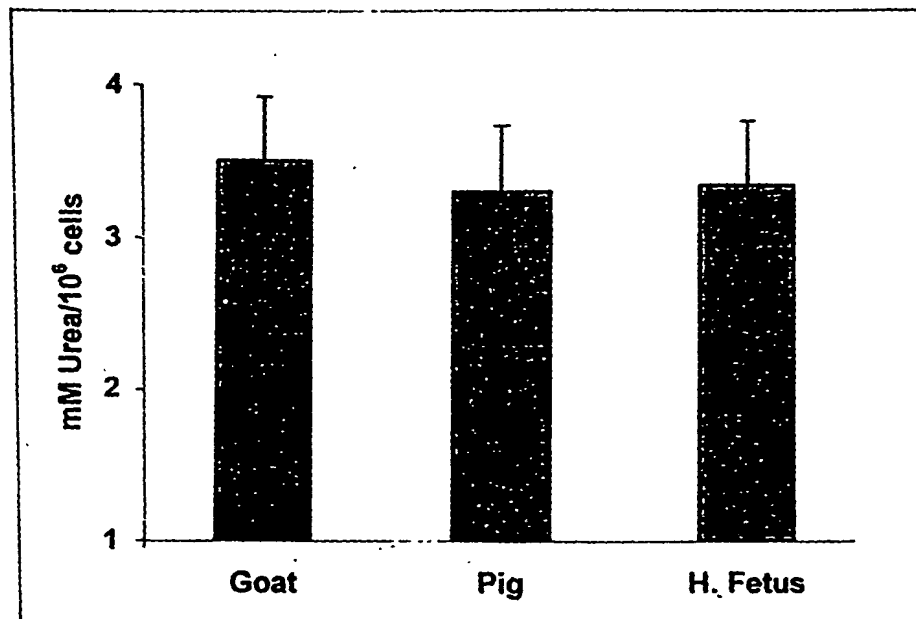
Each value represents mean \pm S.D of eight independent experiments.

Fig. 5 $\text{Na}^+\text{K}^+\text{ATPase}$ activity

Each value represents mean \pm S.D of eight independent experiments.

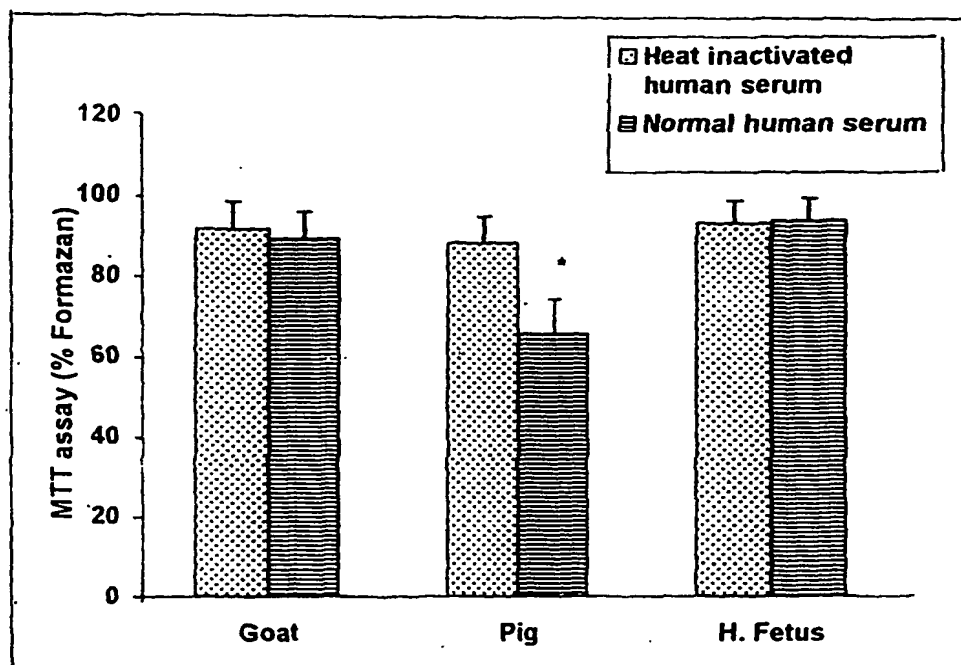
Fig. 6 Lipid Peroxidation

Each value represent mean \pm S.D of eight independent experiments.

Fig.7 Ureagenesis

Each value represents mean \pm S.D of eight independent experiments.

Fig. 8 Comparison of cytotoxicity of human serum with goat, pig and human fetal hepatocytes



Each value represents mean \pm S.D of four separate determinations. Each group in each determination consisted of six experimental samples.

* shows significant difference ($p < 0.01$) compared to pig hepatocytes incubated with heat inactivated human serum and also goat and H.fetal hepatocytes incubated with heat inactivated as well as with normal human serum.

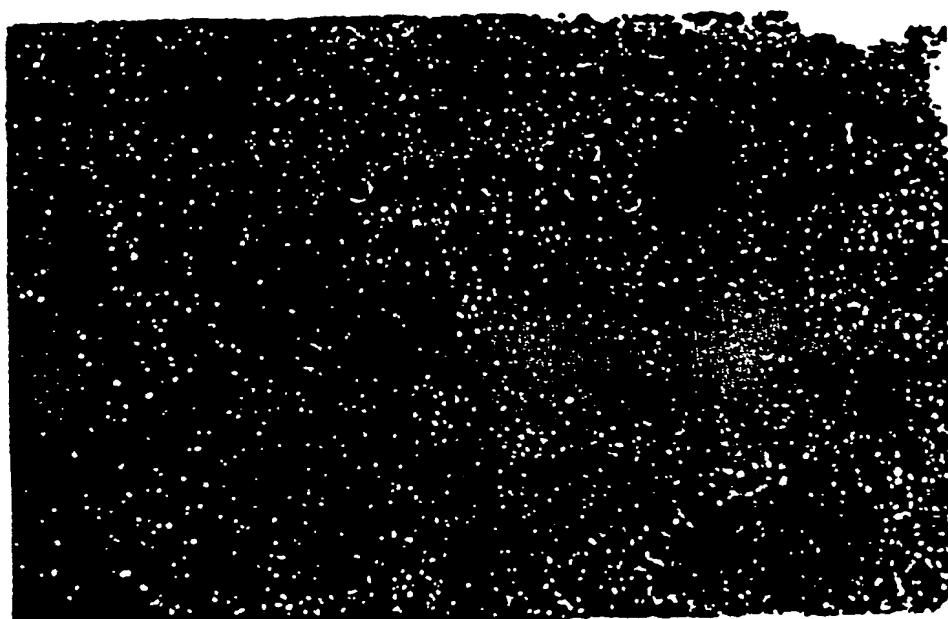


Fig. 9

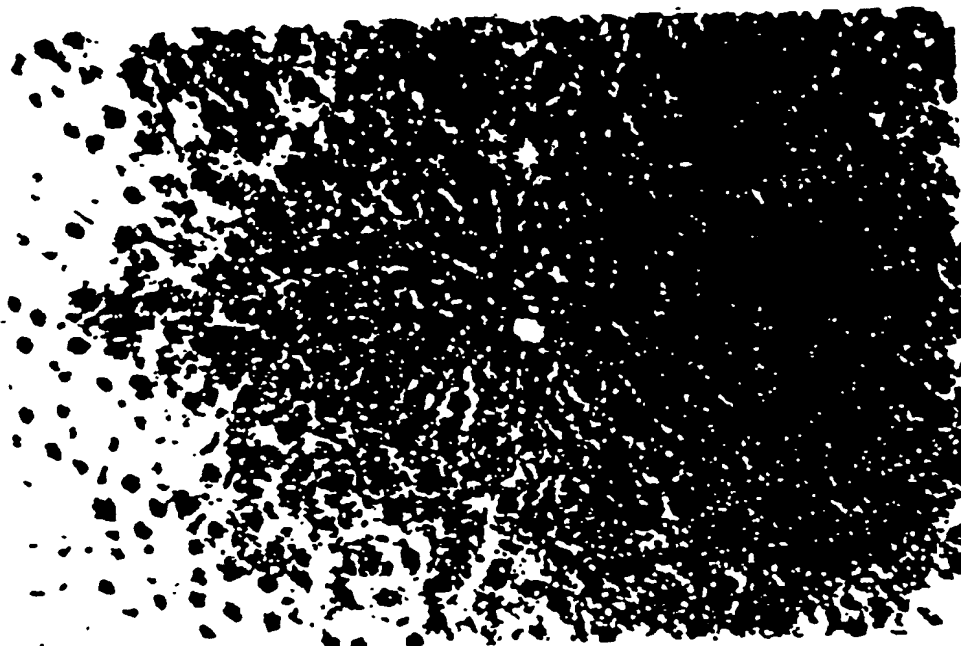


Fig. 10

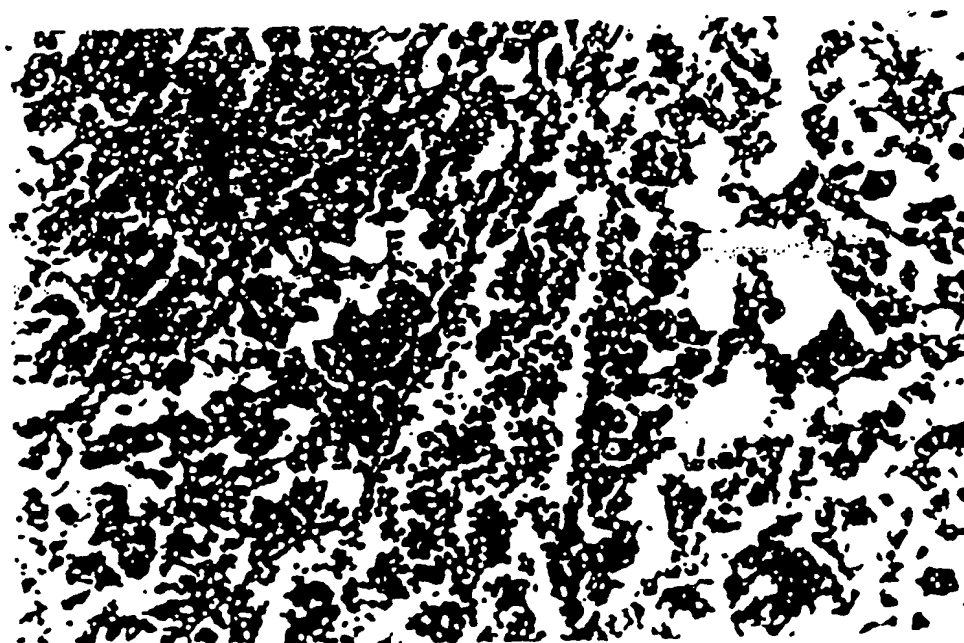
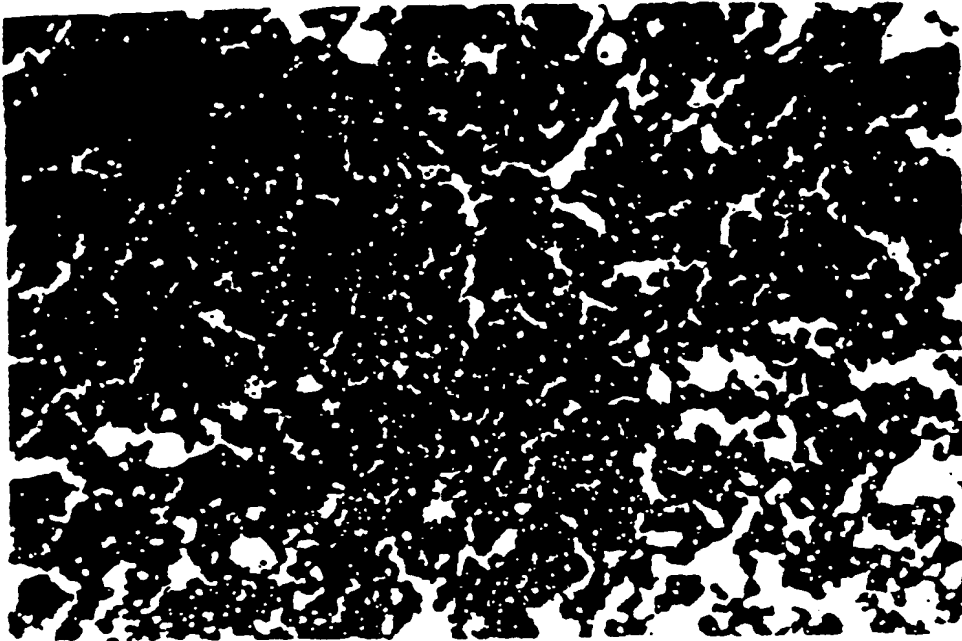
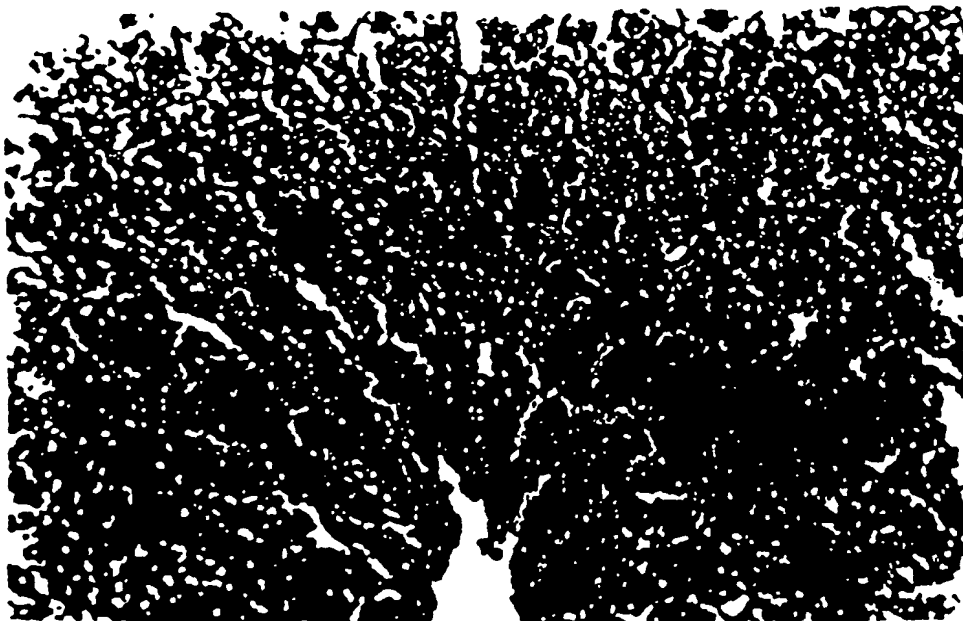


Fig. 11

*Fig. 12**Fig. 13*

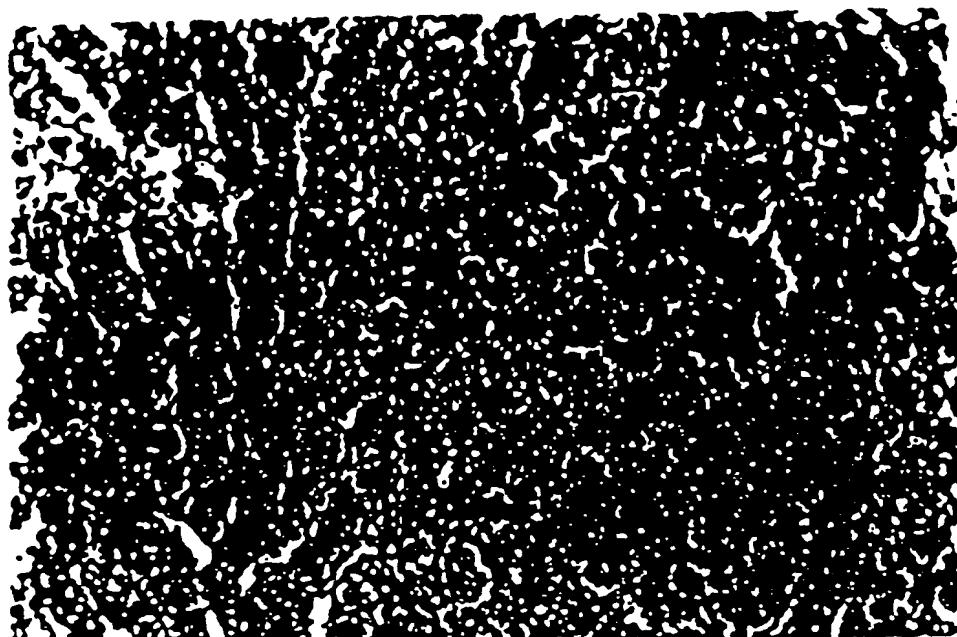


Fig. 14

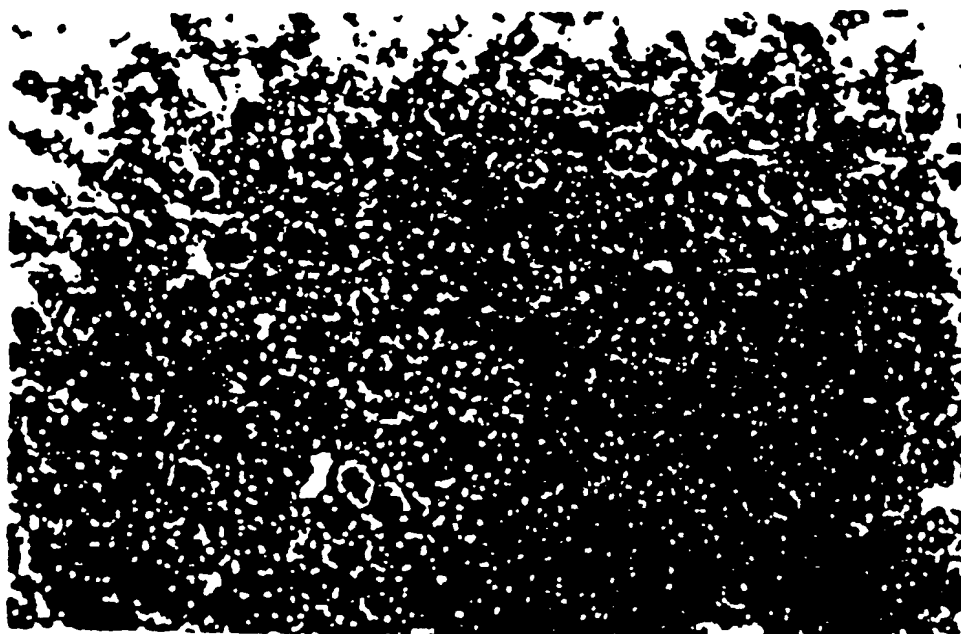


Fig. 15

Table 1 Effect of Antibody Depleted Human Serum on viability of Goat and Pig Hepatocytes

Pig		Goat	
Normal Human Serum	Antibody Depleted Human Serum	Normal Human Serum	Antibody Depleted Human Serum
65.5±8.6*	82.0±8.4	89.3 ± 5.12	90.8 ± 5.7

The values are expressed as % formazan.

Each value represents mean ± S.D of eight independent experiments.

* shows significant difference ($p < 0.01$) compared to antibody depleted serum and goat normal and antibody depleted serum.

**Table 2 Diazepam Metabolism
in Goat Hepatocytes**

Percent Disappeared	Ratio of Peak areas	
	M1 Diazepam	M2 Diazepam
44.03 ± 6.03	0.049 ± 0.004	0.153 ± 0.014

Each value represents mean ± S.D of eight independent experiments.

Table 3 Prothrombin time (seconds)

	Group 1	Group 2	Group 3
0 Day	16.8 ± 2	16 ± 2.1	17 ± 1.78
1 Day	17 ± 1.41	86.8 ± 18.5**	85.3 ± 16.2**
2 Day	16.5 ± 1.66	182.5 ± 14.4**	85 ± 10.6**
5 Day	17 ± 1.41	-	38 ± 11.1**
10 Day	16.8 ± 1.91	-	18.8 ± 2.04
15 Day	17.33 ± 1.47	-	17.5 ± 1.87
20 Day	16.9 ± 1.41	-	17.0 ± 2
25 Day	16.6 ± 1.5	-	17.5 ± 2.5
30 Day	17.27 ± 1.57	-	17.5 ± 1.87

Each value represents mean ± S.D of three separate determinations.

Each group in each determination consisted of six experimental samples.

** indicates significant difference ($P < 0.001$) as compared to group 1.

Table 4 Blood Ammonia ($\mu\text{g/ml}$)

	Group 1	Group 2	Group 3
0 Day	1.073 \pm 0.287	1.06 \pm 0.287	1.05 \pm 0.266
1 Day	1.086 \pm 0.343	3.35 \pm 0.86**	3.31 \pm 0.861**
2 Day	1.075 \pm 0.288	14.835 \pm 3.83**	3.01 \pm 0.85**
5 Day	1.028 \pm 0.266	-	2.44 \pm 0.433**
10 Day	1.076 \pm 0.258	-	1.15 \pm 0.236
15 Day	1.068 \pm 0.272	-	1.065 \pm 0.249
20 Day	1.068 \pm 0.276	-	1.05 \pm 0.248
25 Day	1.058 \pm 0.272	-	1.07 \pm 0.245
30 Day	1.056 \pm 0.279	-	1.06 \pm 0.228

Each value represents mean \pm S.D of three separate determinations. Each group in each determination consisted of six experimental samples.

** indicates significant difference ($P < 0.001$) as compared to group I..

Table 5 Total serum bilirubin (mg/dL)

	Group 1	Group 2	Group 3
0 Day	0.59 ± 0.24	0.63 ± 0.15	0.67 ± 0.19
1 Day	0.62 ± 0.28	1.9 ± 0.22**	1.84 ± 0.21**
2 Day	0.62 ± 0.21	3.2 ± 0.76**	1.81 ± 0.23**
5 Day	0.64 ± 0.29	-	1.55 ± 0.2**
10 Day	0.64 ± 0.26	-	1.25 ± 0.18*
15 Day	0.63 ± 0.21	-	0.72 ± 0.28
20 Day	0.62 ± 0.26	-	0.66 ± 0.14
25 Day	0.65 ± 0.2	-	0.66 ± 0.20
30 Day	0.59 ± 0.181	-	0.64 ± 0.19

Each value represents mean ± S.D of three separate determinations.

Each group in each determination consisted of six experimental samples.

* i (P < 0.01). ** (P < 0.001) indicates significant difference as compared to group I..

Table 6 Alanine aminotransferase activity (IU/L)

	Group 1	Group 2	Group 3
0 Day	52.16 ± 8.7	50.83 ± 9.4	46.33 ± 9.4
1 Day	49.66 ± 8.59	282.6 ± 117.8**	288.5 ± 121.2**
2 Day	52.16 ± 7.08	370.8 ± 58.5 **	278.5 ± 116.5**
5 Day	49.5 ± 9	-	186 ± 7.08**
10 Day	48.5 ± 11.16	-	105.7 ± 10.8**
15 Day	48.16 ± 8.6	-	86 ± 7.08*
20 Day	49.18 ± 10.5	-	60.3 ± 8.12
25 Day	50.18 ± 9.0	-	50 ± 10.8
30 Day	49.83 ± 10.87	-	49.83 ± 6.82

Each value represents mean ± S.D of three separate determinations.

Each group in each determination consisted of six experimental samples.

* (P < 0.01), ** (P < 0.001) indicates significant difference as compared to Group I.

Table 7 Serum albumin (g/dL)

	Group 1	Group 2	Group 3
0 Day	4.616 \pm 0.636	4.42 \pm 0.66	4.65 \pm 0.700
1 Day	4.3 \pm 0.536	4.65 \pm 0.49	4.33 \pm 0.517
2 Day	4.4 \pm 0.56	4.48 \pm 0.66	4.80 \pm 0.66
5 Day	4.61 \pm 0.549	-	4.7 \pm 0.663
10 Day	4.56 \pm 0.634	-	4.48 \pm 0.661
15 Day	4.56 \pm 0.739	-	4.61 \pm 0.577
20 Day	4.55 \pm 0.634	-	4.67 \pm 0.557
25 Day	4.516 \pm 0.616	-	4.77 \pm 0.577
30 Day	4.516 \pm 0.6178	-	4.7 \pm 0.59

Each value represents mean \pm S.D of three separate determinations.

Each group in each determination consisted of six experimental samples.